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installed on the 13 3/8" casing and tested to 1000 psi before drilling out. The BOP stack will be tested to 1500 psi before drilling out of the 8 5/8" casing. The	installed on	The 13 3/0 Cas	1500 pai befor	re drilling out	of the	8 5/8" casi	ng. The

BOP stack will be retested and a PVT, Flowline sensor, pump stroke counter, de-gasse and adjustable choke will be in operation before drilling below 6800'. The acreage is dedicated to the gas company of New Mexico.

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APR 5 1978

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM : If proposal is to deepen or plug back, give data on present productive zone and proposed new productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. mileton Th almost fo 0

24. SIGNED B. B. Salfor	Southern Union Exploratio	m Co. April 3, 1978
(This space for Federal or State office use)	$\overline{\mathbf{V}}$	
PERMIT NO	APPROVAL DATE MAY	<u>1 2 1978</u>
APPROVED BY DE D. Jana	TITLE ACTING DISTRICT ENGINEER	MAY 1 2 1978
CONDITIONS OF APPBOVAL, IF ANY :		
THIS APPROVAL IS RESCINDED IF OPERATIONS ARE NOT COMMENCED WITHIN 3 MONTHS, EXPIRESAUG 1 2 1978	See Instructions On Reverse Side	

- - 4	priate action by either g the use of this form I be issued by, or may te notations. Consult	ements. Consult local	A plat, or plats, separate or on this reverse side, show- en required by Rederal or State agency offices. in any present or objective production zone. oposal before operations are started.					
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Instructions	well op te laws sa, or re surface	or Indi	from t inform ances f	IG OFFI		•		:
	General: This form is designed for submitting proposals to perform certain well operations, as indicated, on all types of lands and leases for appropriate action by either and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from, the local Federal and/or State laws and regulations. Any necessary special instructions concerning the use of this form be obtained from, the local Federal and/or State laws and regulations. Any necessary special instructions concerning the use of this form be obtained from, the local Federal and/or State laws and regulations. Any necessary special instructions concerning the use of this form be obtained from, the local Federal and/or State office. If the proposal is to reduil to the same reservoir at a different subsurface location or to a new reservoir, use this form with appropriate notations. Consult applicable State or Federal regulations for work monosals or records of the new reservoir, use this form with appropriate notations. Consult	Item 4: If there are no applicable State requirements, locations on Federal or Indian land should be described in accordance with Federal requirements.	Item 14: Needed only when location of well cannot readily be found by road from the land or lease description. A plat, or plats, separate or on this reverse sid ing the roads to, and the surveyed location of, the well, and any other required information, should be furnished when required by Rederal or State agency offices. Items 15 and 18: If well is to 26, for has been directionally drilled, give distances for subsurface location of hole in any present or objective production zone. Items 22: Sonsult applicable Federal or State regulations, or appropriate officials, concerning approval of the proposal before operations are started.	★ U.S. GOVERNMENT PRINTING OFFICE: 1974-781-025/VII1-239				
316	aral: This form is designed for gubn I or a State agency, or both, Turshia number of copies to be submithed, p and from, the local Federal and/or f ed from, the proposal is to redrall, to it if the proposal is to redrall to be State or Federal regulations conc	4: If there are no applicable State Federal office for specific instruction	14: Needed only when location of v back for and the surveyed location ( \$ 15 and 18: If well is to the on has 22: Sonsult applicable Federal or	- · · ·		•		
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### N MEXICO OIL CONSERVATION COMMISS WELL LOCATION AND ACREAGE DEDICATION PLAT

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Form C-132 Supersedes C+128 Effective 1-1-65

Ronald J. Eidson 3239

		All distances must be	from the outer boundaries	of the Section	
perator <b>Sou</b>	uthern Union F	xploration Co.	Lease Exxon	Fad	Well Mar.
out etter	Sectoria	Township	Range	red.	2
O A PLASE Stage Las	23	20 South	25 East	Eddy	
1980	feet from the	East line and	T	eet tog the South	line
3490.9	Producing F	Mouon	Undisig	hated monou	Dedicated Acreage: <b>32.0</b> Acres
1. Outline th	ne acreage dedic	cated to the subject v	vell by colored pencil	or hachure marks on the	
2. If more th interest an	nan one lease i nd royalty).	s dedicated to the we	ll, outline each and ic	dentify the area the contract of the second se	NED <sup>is to working</sup>
		unitization, force-pool answer is "yes?" type	mB. etc.		CAL SURVEY
If answer	is "no?" list the	owners and tract des	criptions which have a	ARICOM <sub>2</sub> M actually been consolidate	
this form i	i necessary.)				
No allowat forced-pool sion.	ble will be assig ling, or otherwise	ned to the well until al e)or until a non-standa	l interests have been rd unit, eliminating su	consolidated (by commu ich interests, has been a	unitization, unitization, pproved by the Commis-
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<b></b>	-			l hereby cei	- 3 - 7 8 rtify that the well location s plat was plotted from field
HELL. PROF	GINEER & LAND 1 ATE 04 -676	WEY00		notes of action under my sup	ual surveys made by me or ervision, and that the same correct to the best of my
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# MULTI POINT SURFACE USE AND OPERATIONS PLAN<br/>SOUTHERN UNION EXPLORATION COMPANYAPR 51978EXXON FEDERAL NO. 220.20.5. GEULUGICAL SURVEY<br/>ARTESIA, NEW MEXICO0.5. GEULUGICAL SURVEY<br/>ARTESIA, NEW MEXICO

This plan is submitted with the Application for permit to drill the above well. This plan describes the location of the proposed well, the proposed construction activities and the necessary surface disturbance involved in drilling this well.

#### Item 1

The proposed well in relation of existing highways and the village of Seven Rivers is shown on the attached Topo map. The proposed location is shown in red.

#### Item 2

Attached is a Topo map showing the proposed location, existing roads and trails in the area and the general location of the planned access road. The proposed road will follow an existing road from the American Quasar # 1 Federal well in the SE- $\frac{1}{4}$ of Section 24 in a Southwesterly direction to the Southwest part of the Section. An existing ranch road which runs in an Westerly direction will be repaired and used to the Southeast quarter of Section 23. A new road will be constructed due South approximately 800' to the proposed location. The existing road is shown in blue. The ranch road is shown in green and the new road and location are shown in red.

#### Item 3

On attached Topo map, existing wells within a one mile radius are shown in blue.

#### Item 4

If the proposed well is completed for production, a gas production unit and a condensate tank will be erected on the well site. Condensate will be trucked off and sold. It is not know where the gas line would be constructed by the gas purchaser.

#### Item 5

Water for drilling will be hauled by truck.

#### Item 6

Caliche for surfacing the road will be obtained from an existing pit near the American Quasar # 1 Federal well in Section 24, T2OS, R25E.

#### Item 7

The location will be cleared after completion of drilling operations. All trash will be buried. The mud pits will be allowed to dry and then covered. All attempts within reason will be made to restore the general area to its former condition.

#### Item 8

No ancillary facilities are planned.

#### Item 9

Attached is a rig diagram for the Marcum Rig # 6. The pad size will be 60' to the North of the well, 200' to the South of the well, 150' East of the well, and 160' West of the well. The pit will be plastic lined and the well has been staked and flagged. BOP diagram included.

#### Item 10

After completion of drilling, the area will be cleaned up and levelled as nearly as possible to its original condition as stated in Item 6.

#### Item 11

The topography of this area is very rugged with the ground level elevation changing as much as 300' in the area near the well. The land has little commercial use except for grazing. No residences are located within a mile of the proposed location. All land which will be crossed by roads or used for the drilling pad will be government land.

#### Item 12

The representative responsible for assuring compliance with the approved surface use and operations plan is as follows:

Mr. B. Bernard Lankford, Jr. 300 Building of the Southwest Midland, Texas 79701

Office Phone:	(915)	682–6386
Home Phone:	(915)	694-8209

#### Item 13

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drillsite and access route; that I am familiar with the conditions which presently exist; that the statements made in this plan are, to the best of my knowledge true and correct; and, that the work associated with the operations proposed herein will be performed by Southern Union Exploration Company and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

4-4-78

Date

John

B. Bernard Lankford, Jr. O Consulting Engineer for Southern Union Exploration Company

#### APPLICATION FOR DRILLING

SOUTHERN UNION EXPLORATION COMPANY EXXON FEDERAL NO. 2 660' FSL and 1980' FEL Section 23 T-20S R25E

The following items are submitted in accordance with U.S.G.S. requirements (NTL-6) in support of Form C-101.

- 1. & 2. Shown on Form C-101.
- 3. The geologic surface formation is Seven Rivers.
- 4. A Rotary Drilling Rig will be used.
- 5. Shown on Form C-101.
- 6. The estimated tops of geologic markers are as follows:

San Andres	980 <b>'</b>
Wolfcamp	7450 <b>'</b>
Cisco	8155'
Canyon	8585 <b>'</b>
Strawn	8840'
Atoka	<b>9</b> 480 <b>'</b>
Morrow Lime	9817 <b>'</b>
Morrow Classic	9970 <b>'</b>
Barnett Shale	10,340'

7. The expected depths at which water, oil or gas formations may be encountered are as follows:

Water		75' - 300'
Oil or Gas:	Wolfcamp	7450'
	Cisco	8155'
	Morrow	9817 <b>'</b>

8., 9. & 10. Shown on Form C-101.

- 11. See the attached Mud Program.
- 12. No coring or testing is anticipated. However, DST's may be run if adequate shows are encountered while drilling.
- 13. There are not any anticipated abnormal pressures or temperatures.
- 14. The spud date is approximately June 1, 1978. Drilling operations will take an estimated 45 days.

#### SOUTHERN UNION EXPLORATION COMPANY EXXON FEDERAL NO. 2

Mud Program

0 - 350' Use Gel-Lime spud mud treated with loss circulation material. Dry drill to casing point if loss of circulation occurs.

350' - 2500' Fresh water Ph 10.5. Dry drill to casing point if loss circulation occurs.

2500' - 6500' Fresh water.

6500' - 9400' Add brine to increase weight to 9.0 - 9.1 ppg. Treat out hardness with soda ash and mud up with Drispac/Dextrid mud. Viscosity 32 - 33 sec and water loss 10 - 15cc.

9400' - TD Lower water loss to less than 10cc. Adjust viscosity as needed. Maintain weight at 9.2 - 9.6 ppg. Add 3% KCL prior to drilling Morrow.



Siowout - PREVENTER Assembly API Bul D-13 MArcum Drilling Company  $R_{ic} # 6$ Choke R-BLIND RAMS Blowline Flo R-PIPE RAMS DRILLING SPOOL ArrANGEMENT SRRA (Goptional W/ OPERAtor)

API CLASS 5M-10" WI 4" MANIFold